# Salisbury – Rowan Utilities ANNUAL WASTEWATER SYSTEM REPORT

#### This report covers the Fiscal year from July 1, 2003 through June 30, 2004

On July 21, 1999, North Carolina's Governor signed into law House Bill 1160, placing reporting requirements on municipalities that operate wastewater collection and treatment systems. This legislation mandates that Salisbury – Rowan Utilities publish an annual report informing system users of specific items such as the number of system overflows, violations of permit conditions or environmental regulations, the impact of any such violations on the environment, and corrective measures taken to minimize recurrences.

Reports are available at <a href="www.salisburync.gov">www.salisburync.gov</a>, Town Halls of Salisbury, Granite Quarry, Rockwell, Landis, China Grove, Spencer, East Spencer and the Rowan County Public Library. Any questions pertaining to this report should be directed to <a href="Environmental Services Manager">Environmental Services Manager</a>, Carol Hamilton at 704-638-5375.

## Salisbury-Rowan Utilities Treatment and Collection Staff Contacts:

**Treatment Plants Manager** 

*Randy Cauble* – 704-638-4478

Operator in Responsible Charge of Salisbury-Rowan WWTP

*Mike Frick* – 704-638-5374

**Operator in Responsible Charge of Second Creek WWTP** 

*Frank Kelly* – 704-638-5374

**Operator in Responsible Charge of Residuals Management** 

*Eric Helms* – 704- 638-5379

**Operator in Responsible Charge of Collection System** 

Randy Allman – 704-638-5390

SRU provides wastewater treatment at the Town Creek train located near Interstate 85 and the Grant Creek train off of Grubb Ferry Road. Combined effluents from both trains are disinfected with ultraviolet radiation at the Salisbury-Rowan Wastewater Treatment plant and discharged into the Yadkin River.

SRU treats industrial, commercial and residential waste from Salisbury, Landis, China Grove, Spencer, East Spencer, Rockwell and Granite Quarry. Gravity sewer lines and lift stations collect and pump the wastewater to the treatment trains. An average of 6 million gallons per day is treated using a process called activated sludge. Trash and rags are first removed by bar screens. Heavy particles such as sand and grit settle out as the flow slows in the grit chamber. The wastewater is then pumped to aeration basins, which contain *activated sludge*. The microorganisms or "bugs" feed on the wastewater particles. The process then moves to clarifiers where the "bugs" settle out leaving clear treated wastewater or *effluent*. UV is used for disinfection at the Salisbury-Rowan WWTP.

Solids "left over" from the treatment process are separated from the treated effluent by a filter belt press. The solid material or "biosolids" that is left is applied to permitted farmland in Rowan County as a substitute for fertilizer. Only crops grown for animal feed can be raised after biosolids are applied. SRU's Land Application Program (Permit # WQ001956), Residuals Management, experienced a successful year in 2003. A combined total of 2,794.36 dry tons were land applied across 436 acres of farmland. Salisbury-Rowan Utilities has a total of 1,275 acres of land permitted.

SRU operates a North Carolina certified commercial laboratory where tests are run 6 days per week. The Laboratory is supervised by **Assistant Environmental Services Manager**, *John Ritchie*. He can be reached at 704-638-5376

## **Compliance Status of NPDES Permits**

#### Grant Creek WWTP - Permit NC0023884

There were no violations.

SRU also operates the Second Creek WWTP for Rowan County on Highway 70. The package plant treats an average of 8,000 gallons per day in essentially the same manner as the Salisbury-Rowan WWTP but on a smaller scale. Chlorine is used to disinfect the effluent which is discharged into Second Creek. Solids are pumped and hauled to the Town Creek Treatment train.

Rowan County 2<sup>nd</sup> Creek WWTP – Permit NC0078361

A BOD daily limit of 45 mg/l was exceeded in June 2004.

### WHAT CAN YOU DO TO HELP?

**Never** put grease, oils, food scraps or flammable substances such as solvents down the drain or in the toilet!

**Never** flush paper towels, tampon applicators, feminine hygiene pads, syringes, cotton swabs, etc. down the toilet. (**only toilet tissue**)

These things can cause problems in the lines and/or treatment plants!

For sewer problems, call Water Sewer Maintenance at 704-638-5390 or 704-638-5339 after regular working hours.

Report any illegal dumping into municipal manholes to Environmental Services at 704-638-5375 or 704-638-5376.

## Salisbury-Rowan Utilities Collection System Overflows in 2003

## **SSOs or Sanitary Sewer Overflows**

*July 2	Northside Lift Station	5,000 gal into Second Dutch Creek
*July 2	Southside Lift Station	9,000 gal into Second Dutch Creek
*July 29	Old 80 Lift Station	250 gal into a tributary of Church Creek
*Aug 10	Old 80 Lift Station	955 gal into a tributary of Church Creek
*Aug 16	Legion Lift Station	300 gal into Second Dutch Creek
*Aug 16	Northside Lift Station	375 gal into Second Dutch Creek
*Aug 31	Old 80 Lift Station	950 gal into a tributary of Church Creek
#Sept 23	<b>Town Creek treatment</b>	467,730 gal into Town Creek
Oct 31	17 <sup>th</sup> Street	75 gal into a tributary of Grant Creek
Mar 5	#7 North Circle	50 gal into a tributary of Grant Creek
June 9	Hedrick Street	3,600 gal into a tributary of Grant Creek
June 22	800 S. Railroad Street	800 gal into a tributary of Town Creek

<sup>\*</sup>The above SSOs were cause by Inflow and Infiltration due to heavy rains. Lines have been examined with a TV camera, repaired, cleaned or replaced resulting in fewer SSOs in 2003.

#On September 23, Salisbury experienced 4.5 inches of rain. Other causes were roots, construction and the collapse of a road.

All discharges of any amount that reach surface waters are reported to the Division of Water Quality at the Mooresville Regional Office. In addition, any spills to the ground that exceed 1,000 gallons are reported. Salisbury-Rowan Environmental Services checks all receiving streams for dissolved oxygen, pH, temperature and any environmental impacts at upstream and downstream sites of each spill.

If a discharge of 1,000 gallons or more reaches surface waters, a notice is placed in The Salisbury Post within 48 hours. If the discharge is more than 15,000 gallons, a notice is also placed in The Stanley News for the affected county downstream of Salisbury.